P30190 S01

Claims

- Groove profile for a positive hub-shaft connection with an essentially rectangular or trapezoidal groove cross section (3), characterized in that the groove root (5) or the groove head (4) either of the hub (1) or of the shaft (2) has at least one rib (6) projecting radially outwards.
- Groove profile according to claim 1, characterized in that each groove root (5) or each groove head (4) of the hub (1) or of the shaft (2) has at least one rib (6).
- Groove profile according to claim 1 or 2, characterized in that the rib (6) is
 embodied running parallel to the flank (7) of the groove (3), preferably
 along the entire length of the corresponding groove root (5) or groove
 head (4).
- 4. Groove profile according to one of claims 1 through 3, characterized in that the rib (6) has a trapezoidal cross section tapering outwards and has a maximum width (b) of 50%, preferably 25%, of the width (B) of the corresponding groove root (5) or groove head (4).
- 5. Groove profile according to one of claims 1 through 4, characterized in that the radius of the support surface of the rib (6) to the opposite groove root (5) or groove head (4) is embodied free from play or with initial stress with respect to the longitudinal axis of the hub (1) or the shaft (2).
- Groove profile according to one of claims 1 through 5, characterized in that at least two ribs (6) arranged parallel to one another are respectively embodied in one groove root (5) or groove head (4).
- Telescopic tube for drive shafts with an inner tube (2) and an outer tube (1), whereby the inner tube (2) or the outer tube (1) has a groove profile (3) according to one of claims 1 through 6.
- Telescopic tube according to claim 7, characterized in that the inner tube
 and the outer tube (1) are embodied as hollow bodies with approximately uniform profile thickness.

P30190.S01

- 9. Method for producing a groove profile (3) according to one of claims 1 through 6 by a cold forming method, characterized in that one or more profile rolls or profile rollers are brought into engagement with the surface of the hub (1) or shaft (2) in conformity with the profile mandrel necessary for profiling and located within the hollow member and having a profile embodied in accordance with the rib. (6).
- 10. Method according to claim 9, characterized in that the profile rolls or profile rollers are preferably brought into periodic impacting engagement.